

# **GARIweb Usability Testing**

**Project:** GARIweb (Geographic Analysis and Research Interface)

Goal: Update the City's aging GIS (Geographic Information Systems) web technology

with a new system of maps that is more meaningful, usable, interactive, and better

integrated in the City's web site.

# 1. What is usability testing?

Usability testing is a technique used to evaluate a product by testing it on people representative of those who are going to use it – we call these people users. This is a valuable practice for developers like us because we get direct input on how real users will use what we've designed.

# 2. Why are we conducting usability testing?

By asking a range of users to test the website, we will be able to identify and address sources of confusion and errors in its design that we might otherwise miss. By avoiding costly fixes, usability testing reduces the overall cost of a custom application like GARIweb, especially when performed early in the development process. In addition, by increasing user satisfaction, we add to the sustainability of the application, and therefore the cost of replacement.

# 3. What does the process entail and how much time will it take?

The process consists of a short usability test on the computer (approximately 20 minutes per user). While the user is navigating through our GARIweb prototype (see FAQ #4 below), the person conducting the testing will take notes on all of the questions, processes, and steps taken without regard to skill level, search terms, methods, devices, and order of control exploration. The goal is to understand how the design of GARIweb can best serve the needs of those who will use it. The experience is very relaxed because usability testing is focused on testing the application, and <u>not</u> the user.

#### 4. What is a Prototype?

For these purposes, a prototype is an early model of a website, built in hours using inexpensive "mock up" tools and techniques instead of months of expensive programming tools and techniques. It has very limited functionality, but its behavior emulates the actual website. By designing an initial product that looks and acts similarly to our final product, we can explore design alternatives with users prior to starting production of GARIweb. After refining the prototype using usability testing, the result will provide specifications for a real, working system.

### 5. When and where will testing be held?

Opportunities for community participation will be available at various times and locations throughout the city (e.g., libraries, rec/community centers). Please visit the <a href="website">website</a> (<a href="www.alexandriava.gov/gis">www.alexandriava.gov/gis</a>) for details.

# 6. What kind of tester are you looking for?

To ensure that we address all possible issues that may come up with the site design and content, we hope to get participation from a wide spectrum of testers. Some key characteristics of users we want to test include people who are non-technical, technical, curious, creative, map lovers, those with a GIS background, and those who might not find maps particularly useful. We also want to ensure that the usability testers are people of various genders, ages, education levels, and skillsets.

### 7. Will the testing be anonymous and how will the results be calculated?

The testing will be anonymous. Initially, we will collect qualitative data derived from our observations, but ultimately we hope to quantify our results. The detailed data we collect will be stored and anonymized in an internal GIS data file.

For more information please visit our website (www.alexandriava.gov/gis).